

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANT: TSAY, Shiu-Chu

SERIAL NO.:

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TITLE: AUTOMATIC SUCTION STRUCTURE OF A VACUUM CONTAINER

Preliminary Amendment: CLAIM AMENDMENTS

1. (Currently amended) A vacuum container comprising:

a body having a hollow interior;

a cap having an interior and a shape to fit airtightly with a top rim of said body; and

an automatic suction structure disposed in ~~the~~ an interior of said cap for drawing air out of the hollow interior of said body;

wherein said automatic suction structure comprises:

a suction device ~~formed~~ comprised of a motor connected to a power source by a circuit, a deceleration gear set driven by said motor, a suction pump actuated by said deceleration gear set via a connection rod, and an air-exhausting valve in communication with said suction pump;

a detecting device mounted in a guide portion of an edge of said cap and ~~formed~~ comprised of an action member, a contact control element in contact with one end of said action member, and a recovery element for providing said action member with a recovery force to enable said action member to return to an original position thereof whereby said action member is activated to trigger said contact control element to deactivate the circuit connecting said motor of said suction device with the power source;

a monitoring device ~~formed~~ comprised of an expandable casing and a sensor whereby said expandable casing is extended at one end into the hollow interior of said body and is capable of changing a size thereof in response to a change in air pressure in the hollow interior of said body, thereby triggering said sensor to activate or deactivate the circuit connecting said motor of said suction device with the power source; and

a releasing device ~~formed~~ comprised of a release valve, a plug slidably disposed in said ~~release~~ release valve, a movable action rod to activate or deactivate said release valve, a control block linked with said plug, and a switching element capable of being activated by said control block at the time when said plug is acted on by said action rod, thereby resulting in interruption of power supply to said motor of said suction device.

2. (Currently amended) The vacuum container as defined in claim 1, wherein said suction device is ~~provided with~~ comprised of a built-in battery set serving as ~~the~~ power source of said motor.

3. (Original) The vacuum container as defined in claim 1, wherein said motor of said suction device is externally connected to a power source.

4. (Original) The vacuum container as defined in claim 1, wherein said monitoring device further comprises an auxiliary expandable element fitted into said expandable casing such that one end of said auxiliary expandable element is extended into the hollow interior of said body.

5. (Original) The vacuum container as defined in claim 1, wherein one end of said action rod of said releasing device is extended out of the interior of said cap at the time when said releasing device is at work to enable said cap to be separated from said body.